

**37 CFR 1.501  
INFORMATION DISCLOSURE CITATION  
IN A PATENT APPLICATION**

(Use several sheets if necessary)

Docket Number (Optional)  
NREL IR# 99-50Patent Application Number  
09/841,691

Applicant Mascarenhas, Angelo

Filing Date April 24, 2001

Group Art Unit 1895

**U. S. PATENT DOCUMENTS**

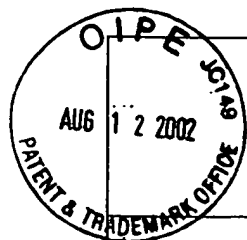
EXAMINER INITIAL	DOCUMENT NUMBER	DATE	NAME	CLASS	SUBCLASS	FILING DATE IF APPROPRIATE
	6 0 0 2 2 0 2	12/99	Mayer <i>et al.</i>	313	420	
	5 9 8 6 2 8 8	11/99	Hasegawa	257	94	
	5 9 6 3 5 7 1	10/99	Wingreen	372	45	
	5 8 9 5 2 2 5	4/99	Kidoguchi <i>et al.</i>	438	47	
	5 7 7 6 7 9 3	7/98	Lee <i>et al.</i>	438	35	
	5 7 2 8 2 3 1	3/98	Negami <i>et al.</i>	148	33	
	5 4 5 3 4 0 4	9/95	Leedy	437	203	
	5 3 8 7 5 4 4	2/95	Hayafuji	437	151	
	5 3 4 4 7 9 1	9/94	Huang	437	126	
	5 2 3 1 2 9 8	7/93	Daly	257	191	
	5 1 5 8 8 9 6	10/92	Burroughes <i>et al.</i>	437	5	
	5 1 1 6 4 5 5	5/92	Daly	156	605	
	5 0 2 8 5 6 1	7/91	Ramath <i>et al.</i>	437	105	
	4 9 3 9 1 0 3	7/90	Szolgyemy	437	151	
	4 5 9 1 6 5 4	5/86	Yamaguchi <i>et al.</i>	136	252	
	4 4 0 0 2 2 1	8/83	Rahilly	148	1.5	
	4 2 8 4 9 6 2	8/81	Esterowitz <i>et al.</i>	331	94.5F	

**FOREIGN PATENT DOCUMENTS**

	DOCUMENT NUMBER	DATE	COUNTRY	CLASS	SUBCLASS	Translation	
						YES	NO

**OTHER DOCUMENTS (Including Author, Title, Date, Pertinent Pages, Etc.)**

	Oe, K. and Okamoto, H., "New Semiconductor Alloy $\text{AgAs}_{1-x}\text{Bi}_x$ Grown by Metal Organic Vapor Phase Epitaxy", <i>Japanese Journal of Applied Physics</i> , Vol. 37, pp. L1283 - L1285, November 1998.
	Yamamoto, T. and Katayama-Yoshida, H., "Solution Using a Codoping Method to Unipolarity for the Fabrication of <i>p</i> -Type ZnO", <i>Japanese Journal of Applied Physics</i> , Vol. 38, Pt. 2., No. 2B, pp. L166 - L169, February 1999.
	Ploog, K. H. and Brandt, O., "Doping of group III nitrides", <i>Journal of Vacuum Society Technology A</i> , Vol. 16, No. 3, pp. 1609 - 1614, May/June 1998.
	Yamamoto, T. and Katayama-Yoshida, H., "Role of Cl or I Codoping in Li-Doping Enhancement in ZnSe", <i>Japanese Journal of Applied Physics</i> , Part 2, No. 8A, pp. L910 - L912, August 1998.



	Brandt, O.; Yang, H.; Kostial, H.; and Ploog, K.H. "High <i>p</i> -type conductivity in cubic GaN/GaAs(113)A by using Be as the acceptor and O as the codopant", <i>Applied Physics Letters</i> , Vol. 69, No. 18, pp. 2707 - 2709, October 1996.
	Pankove, J.I.; Torvik, J.T.; Qui, C.-H.; Grzegory, I.; Porowski, S.; Quigley, P.; and Martin, B., "Molecular Doping of Gallium Nitride", <i>Applied Physics Letters</i> , Volume 74, Number 3, pp. 416 - 418, January 1999.
	White, C.W.; Budai, J.D.; Zhu, J.G.; and Withrow, S.P., "Ion-beam synthesis and stability of GaAs nanocrystals in silicon", <i>Applied Physics Letters</i> , Vol. 68, No. 17, pp. 2389 - 2391, April 1996.
	Withrow, S.P.; Holland, O.W.; Pennycook, S.J.; Pankove, J.; and Mascarenhas, A., "Beam-Solid Interactions: Physical Phenomena", <i>Materials Research Society Symposium Proceedings</i> , Volume 157, pp. 143 - 148, (1990).
	Kuznetsov, V.V.; Pikhtin, A.N.; Rázbegaev, V.N.; and Sorokin, V.S., "High-temperature luminescence of GaP:BiN", <i>Sov. Phys. Semicond.</i> , 14(4), pp. 417 - 419, April 1980.
	Trumbore, M.; Gershenson, M.; and Thomas, D.G., "Luminescence due to the Isoelectronic Substitution of Bismuth for Phosphorus in Gallium Phosphide", <i>Applied Physics Letters</i> , Volume 9, Number 1, pp. 4 - 6, July 1966.
EXAMINER	DATE CONSIDERED

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